

IN THE SPECIFICATION:

Please replace paragraph number [0001] with the following rewritten paragraph:

[0001] This application is a continuation of application Serial No. 10/117,244, filed April 5, 2002, ~~pending now U.S. Patent 6,58,854, issued July 8, 2003~~, which is a continuation of application Serial No. 09/832,163, filed April 9, 2001, now U.S. Patent ~~6,400,840-B2~~ ~~6,400,840~~, issued June 4, 2002, which is a continuation of application Serial No. 09/440,736, filed November 16, 1999, now U.S. Patent No. ~~6,226,394-B1~~ ~~6,226,394~~, issued May 1, 2001, which is a continuation of application Serial No. 09/027,144, filed February 20, 1998, now U.S. Patent No. 6,049,624, issued April 11, 2000.

Please replace paragraph number [0002] with the following rewritten paragraph:

[0002] This application is also related to the following copending applications: an application entitled "Method for Sorting Integrated Circuit Devices," filed January 17, 1997 and having Serial No. 08/785,353, now U.S. Patent 5,927,512, issued July 27, 1999; an application entitled "Method of Sorting a Group of Integrated Circuit Devices for Those Devices Requiring Special Testing," filed February 17, 1997 and having Serial No. 08/801,565, now U.S. Patent 5,844,803, issued December 1, 1998; an application entitled "Method in an Integrated Circuit (IC) Manufacturing Process for Identifying and Redirecting IC's Misprocessed During their Manufacture," filed February 26, 1997 and having Serial No. 08/806,442, now U.S. Patent 5,915,231, issued June 22, 1999; an application entitled "Method for Continuous, Non-Lot Based Integrated Circuit Manufacturing," filed March 24, 1997 and having Serial No. 08/822,731, now U.S. Patent 5,856,923, issued January 5, 1999; and an application entitled "Method for Using Data Regarding Manufacturing Procedures Integrated Circuits (IC's) Have Undergone, Such as Repairs, to Select Procedures the IC's Will Undergo, Such as Additional Repairs," filed June 6, 1997 and having Serial No. 08/871,015, now U.S. Patent 5,907,492, issued May 25, 1999.

Please replace paragraph number [0010] with the following rewritten paragraph:

[0010] An example of ICs being tracked through a portion of assembly using lot numbers is shown in FIG. 2. In the example, ICs are first processed on molding equipment to encapsulate them. Once encapsulated, ICs are fed into output carriers 20, each of which has a unique carrier number (e.g., a bar code). The lot numbers of ICs fed into a particular output carrier 20 are stored in association with the carrier number of the carrier 20 in a data store 22, such as a computer memory system. The output carriers 20 containing the encapsulated ICs are then placed on shelves, with the carrier number of each output carrier 20 being stored in the data store 22 in association with a unique shelf number of the shelf on which the output carrier 20 is placed (e.g., by scanning in the bar code of each output carrier 20 and a bar code of the shelf on which it is placed). Later, selected ICs are retrieved by lot from the shelves for processing on ~~de-flash~~ equipment by first identifying the output carriers 20 associated in the data store 22 with the lot number of the selected ICs, then identifying the shelves associated in the data store 22 with the carrier numbers of the identified output carriers 20, and finally retrieving the identified output carriers 20 from the identified shelves for processing.

Please replace paragraph number [0016] with the following rewritten paragraph:

[0016] As described in U.S. Patent No.'s 5,301,143, 5,294,812, and 5,103,166, some non-lot based methods have been devised to aid quality control personnel in tracking ICs undergoing failure analysis back to the wafer from which they come. By tracking the ICs back to their wafer, test data related to the ICs can be correlated to the wafer to pinpoint possible problems with the wafer. Such methods take place off the manufacturing line, and involve the use of electrically retrievable identification (ID) codes, such as so-called "fuse ID's," programmed into individual ICs to identify the ICs. Fuse ID's and other electrically retrievable ID codes are typically programmed into ICs by blowing selected fuses or anti-fuses in circuitry on the ICs so that the circuitry outputs the ID code when accessed. Unfortunately, none of these methods addresses the inefficiency and reliability problems associated with the conventional ~~lot-lot~~-based tracking procedure described above.

Please replace paragraph number [0031] with the following rewritten paragraph:

[0031] So that the IC device 42 may be individually located within assembly, the machines 46 that assemble the IC device 42, the IC device carriers 48 that store the ~~device~~ IC device 42, and the shelves 50 or bins 52 that store the carriers 48 each have a unique ID number. In addition, the carriers 48 and the IC device 42 each have a location code that identifies their respective locations. The location code of the IC device 42 may, for example, indicate that the IC device 42 is located in a particular carrier 48, or that the IC device 42 is being processed on a particular machine 46. Similarly, the location code of the carrier 48 may, for example, indicate that the carrier 48 is mounted at the input to a particular machine 46, mounted at the output of the machine 46, or stored on a particular shelf 50 or in a particular bin 52. By constantly updating these location codes during assembly, the IC device 42 can be located at any time within assembly by referring to the lead frame ID code of the IC device 42, which points the way to the machine 46, shelf 50, or bin 52 at which the IC device 42 is located.

Please replace paragraph number [0038] with the following rewritten paragraph:

[0038] Once the ICs are attached to the lead frames 66, the resulting IC devices are output from the die attach equipment and stored in carriers 72, such as IC device magazines or tubes. As described previously with respect to FIG. 4, the carriers 72 each have an associated carrier ID number (*e.g.*, a bar code) and location code stored in the data store 68. Because the carriers 72 are mounted at the output of the die attach equipment, the location codes of the carriers 72 indicate this. At the same time, as the IC devices exit the die attach equipment, the location codes of the devices are updated in the data store 68 to indicate that the IC devices are located in particular carriers 72. If the IC devices have to be stored before proceeding to the next step in assembly, the carriers 72 are stored on a shelf (not shown) or in a bin (not shown), and the location codes of the carriers 72 are updated in the ~~date~~ data store 68 to indicate their location at a particular shelf having a shelf ID number or in a particular bin having a bin ID number.